al. Attorney's Docket No.: 08919-099001 / 09A-910930

Applicant: Jei-Fu Shaw et al. Serial No.: 10/763,042

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Amendments to the Claims:

This listing of claims replaces all prior versions and listings of claims in the application:

Listing of Claims:

- 1-5. (Cancelled).
- 6. (Currently Amended) An isolated nucleic acid comprising a <u>cDNA</u> sequence that encodes a polypeptide, wherein the polypeptide contains an amino acid sequence <u>which has</u> at least 70% identical to SEQ ID NO: 9 and has activity of increasing the sensitivity of a plant to an environmental factor.
- 7. (Currently Amended) An isolated nucleic acid that, under a high stringency condition, hybridizes to a probe containing the sequence of SEQ ID NO: 20; or the complement thereof, wherein the nucleic acid encodes a polypeptide that has activity of increasing the sensitivity of a plant to an environmental factor.
 - 8. (Previously Presented) A vector comprising the isolated nucleic acid of claim 6.
 - 9. (Previously Presented) A vector comprising the isolated nucleic acid of claim 7.
 - 10. (Previously Presented) A host cell comprising the isolated nucleic acid of claim 6.
 - 11. (Previously Presented) A host cell comprising the isolated nucleic acid of claim 7.
- 12. (Original) The host cell of claim 10, wherein the host cell is an E. coli, a yeast, an insect, a plant, or a mammalian cell.

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13. (Original) The host cell of claim 11, wherein the host cell is an E. coli, a yeast, an insect, a plant, or a mammalian cell.

14. (Original) A method of producing a polypeptide, the method comprising culturing the host cell of claim 10 in a medium under conditions permitting expression of the polypeptide, and

isolating the polypeptide.

15. (Original) A method of producing a polypeptide, the method comprising culturing the host cell of claim 11 in a medium under conditions permitting expression of the polypeptide, and

isolating the polypeptide.

- 16. (Withdrawn) A transformed plant cell that lacks a polypeptide containing a sequence of SEQ ID NO: 1, 2, 3, 4, 5, 6, 7, 8, 9, 10, or 11, wherein, compared with the wild type cell, the transformed plant cell has a higher tolerance to salt, chilling, pathogens, oxidative stress, or water-deficit due to absence of expression of the polypeptide.
 - 17. (Withdrawn) The plant cell of claim 16, wherein the cell is an Arabidopsis cell.
 - 18-19. (Cancelled).
- 20. (Withdrawn) A method of producing a transformed plant cell, the method comprising introducing into a plant cell a nucleic acid that decreases the expression of a gene encoding a polypeptide of SEQ ID NO: 1, 2, 3, 4, 5, 6, 7, 8, 9, 10, or 11, wherein, compared with the wild type cell, the transformed plant cell has a higher tolerance to salt, chilling, pathogens, oxidative stress, or water-deficit due to absence of the polypeptide.

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21. (Cancelled).

- 22. (Previously Presented) A transformed plant cell comprising a recombinant nucleic acid that encodes the heterologous polypeptide of SEQ ID NO: 9.
- 23. (Previously Presented) A transgenic plant comprising a recombinant nucleic acid that encodes the heterologous polypeptide of SEQ ID NO: 9.
- 24. (Previously Presented) A method of producing a transformed plant cell, the method comprising:

introducing into a plant cell a recombinant nucleic acid encoding the heterologous polypeptide of SEQ ID NO: 9, and

expressing the polypeptide in the cell.

25. (Previously Presented) A method of producing a transgenic plant, the method comprising:

introducing into a plant cell a recombinant nucleic acid encoding the heterologous polypeptide of SEQ ID NO: 9,

expressing the polypeptide in the cell, and cultivating the cell to regenerate a plant.

- 26. (Previously Presented) A transformed plant cell comprising a heterologous sequence containing the recombinant nucleic acid of claim 6.
- 27. (Previously Presented) A transgenic plant comprising a heterologous sequence containing the recombinant nucleic acid of claim 7.

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28. (Previously Presented) A method of producing a transformed plant cell, the method comprising:

introducing into a plant cell a heterologous sequence containing the nucleic acid of claim 6, and

expressing the polypeptide in the cell.

29. (Previously Presented) A method of producing a transgenic plant, the method comprising:

introducing into a plant cell a heterologous sequence containing the nucleic acid of claim 7, and

cultivating the cell to regenerate a plant.

- 30. (Previously Presented) The isolated nucleic acid of claim 6, wherein the amino acid sequence is at least 80% identical to SEQ ID NO: 9.
- 31. (Previously Presented) The isolated nucleic acid of claim 30, wherein the amino acid sequence is at least 90% identical to SEQ ID NO: 9.
- 32. (Previously Presented) The isolated nucleic acid of claim 31, wherein the amino acid sequence is at least 95% identical to SEQ ID NO: 9.
- 33. (Previously Presented) The isolated nucleic acid of claim 32, wherein the amino acid sequence is SEQ ID NO: 9.